

PERFORMANCE ASSESSMENT

EXECUTIVE SUMMARY

December 2005







A Report by the Assessment Panel of the

Defense Acquisition Performance Assessment Project

For the Acting Deputy Secretary of Defense

Defense Acquisition Performance Assessment

Executive Summary

December 2005

Panel

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Foreward

On the surface, defense acquisition appears to have little in common with commercial acquisition. For starters, defense acquisition occurs in a monopsony. Further, it is replete with mini-monopolies. (From how many places could one have purchased, say, an additional B-2?). Defense acquisition also operates in a governmental system that intentionally traded optimal efficiency for strong checks and balances – such as those implicit in separating the Legislative and Administrative branches. Nonetheless, there are certain fundamentals of sound management which are applicable virtually everywhere, including in the defense acquisition process. They are just much more difficult to apply in government, where the stakes are higher, authority less hierarchical, and the spotlight much brighter.

The problems in defense acquisition – and there are many – tend to be widely misunderstood. Outright dishonesty, for example, is extraordinarily rare...but when it occurs its impact is particularly devastating. Over the years, toilet seats, coffee pots and screwdrivers have also received an abundance of ink, but they are not the problem either.

A number of studies of the defense acquisition process have been conducted since the genre was born with the Hoover study in 1949. There is remarkable agreement as to the problems which need to be addressed. The difficulty resides in having the will to do anything about those problems.

Gil Fitzhugh's study in 1966 observed that a fundamental problem is that everyone is responsible for everything and no one is responsible for anything. Dick DeLauer's study in the 1970's concluded that the problem was "turbulence" – perpetually changing budgets, schedules, requirements and people. Dave Packard's somewhat more recent study pointed to the shortage of experienced managers as the root cause of many problems. And in a particularly indiscreet moment, I once described the defense acquisition process as "the epoxy that greases the wheels of progress."

But it is important to note that in spite of such criticisms, the Department of Defense's acquisition process has provided our armed forces with the equipment that is the envy of the world's military forces. It's just that it could, and should, do even better.

The present review, requested by Secretary England (himself deeply experienced in acquisition management), affords a relatively unique opportunity. Change is almost always the result of a culmination of pressures, and rarely are those pressures greater than today as our nation conducts multiple combat operations, recovers from hurricanes, counters terrorist threats here at home, and endures intense budgetary demands.

Experience suggests that promising areas to look for progress include seeking experienced, capable managers; supporting basic research; starting fewer and finishing more projects; reducing turbulence; assigning clear responsibilities; providing financial reserves; incrementally budgeting to milestones; accepting prudent risks; controlling cost; disciplining requirements; utilizing appropriate contractual and competitive instruments; emphasizing reliability; creating fast-tracks; and, as always, insisting on ethical comportment.

Our nation's military forces may be called upon to fight outnumbered, to fight at great distances from home, and to win with very few casualties. Only with a properly functioning defense acquisition process can this be possible. The present review, as was the case with its predecessors, will ultimately be judged not by how well it identified the problems, or even how well it points to the solutions. It will be judged by what it (the DAPA Project) actually makes happen.

Norman R. Augustine









DEPUTY SECRETARY OF DEFENSE 1010 DEFENSE PENTAGON WASHINGTON, DC 20301-1010

JUN -- 7 2005

MEMORANDUM FOR SECRETARIES OF THE MILITARY DEPARTMENTS

CHAIRMAN OF THE JOINT CHIEFS OF STAFF
UNDER SECRETARIES OF DEFENSE
COMMANDERS OF THE COMBATANT COMMANDS
ASSISTANT SECRETARIES OF DEFENSE
GENERAL COUNSEL OF THE DEPARTMENT OF DEFENSE
DIRECTOR, OPERATIONAL TEST AND EVALUATION
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ASSISTANTS TO THE SECRETARY OF DEFENSE
DIRECTOR, ADMINISTRATION AND MANAGEMENT
DIRECTOR, PROGRAM ANALYSIS AND EVALUATION
DIRECTOR, NET ASSESSMENT
DIRECTOR, FORCE TRANSFORMATION
DIRECTORS OF THE DEFENSE AGENCIES
DIRECTORS OF THE DOD FIELD ACTIVITIES

SUBJECT: Acquisition Action Plan

There is a growing and deep concern within the Congress and within the Department of Defense (DoD) Leadership Team about the DoD acquisition processes. Many programs continue to increase in cost and schedule even after multiple studies and recommendations that span the past 15 years. In addition, the DoD Inspector General has recently raised various acquisition management shortcomings.

By this memo, I am authorizing an integrated acquisition assessment to consider every aspect of acquisition, including requirements, organization, legal foundations (like Goldwater-Nichols), decision methodology, oversight, checks and balances – every aspect. The output of this effort, provided to me through the Under Secretary of Defense (Acquisition, Technology and Logistics), will be a recommended acquisition structure and processes with clear alignment of responsibility, authority and accountability. Simplicity is desirable.

This effort will be sponsored by the USAF with Dave Patterson as lead. The first action will be to establish a baseline of recommendations from earlier studies and to integrate all other acquisition reform activities into a single coordinated roadmap. This roadmap will determine the schedule to implementation and will be delivered to the DoD Leadership team within 30 days.

Restructuring acquisition is critical and essential. Accordingly, kindly cooperate fully with Dave in this assignment. Dave Patterson can be reached at (703) 695-8777. Thanks.

Gordon England (

Acting Deputy Secretary of Defense



OSD 10870-05





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"The committee is concerned that problems with organization structure, shortfalls in acquisition workforce capabilities, and personnel instability continued to undermine the performance of major weapons systems programs. ...Problems occur because Department of Defense's weapon programs do not capture early on the requisite knowledge that is needed to efficiently and effectively manage program risks....The committee believes that one answer can be found in the inability of the Department to address the budget and program stability issues.Funding and requirements instability continue to drive up costs and delays the eventual fielding of new systems."

Senate Report 109-069 - S1042 Title VIII Acquisition Policy, Acquisition Management and Related Matters - p. 341 May 17, 2005

"... The committee is concerned that the current Defense Acquisition Management Framework is not appropriately developing realistic and achievable requirements within integrated architectures for major weapons systems based on current technology, forecasted schedules and available funding"

House Conference Report #
109-89 - HR- 1815 Title VIII
- Acquisition Policy, Acquisition
Management, and Related
Matters p. 355 May 20, 2005

Executive Summary

Context

For nearly 60 years the Department of Defense has been engaged in a continuing self assessment process to identify and improve the way it acquires weapon systems. There have been frequent major acquisition reform initiatives responding to concerns that acquisition costs are too high, that the Department is buying the wrong things, or that the organization's process is too slow.

During Secretary of the Navy Gordon England's confirmation hearings to become Deputy Secretary of Defense, discussion with Senators on the Senate Armed Services Committee highlighted the main issue, that both Congress and Department of Defense senior leadership have lost confidence in the Acquisition System's ability to determine what needs to be procured or to predict with any degree of accuracy what things will cost, when they will be delivered, or how they will perform. The House and Senate Fiscal Year 2006 Defense Authorization Committee Reports raised concerns about the ability of the Department's Acquisition System to develop and deliver required capabilities when needed and at predictable costs. These reports further state that addressing symptoms one program or one process at a time is unlikely to result in substantial improvement.

Task

On June 7, 2005, the Acting Deputy Secretary of Defense, Gordon England, authorized a sweeping and integrated assessment to consider "every aspect" of acquisition, giving rise to the Defense Acquisition Performance Assessment Project. The centerpiece of the project is a panel governed by the tenets of the Federal Advisory Committee Act of 1972 (Public Law 92-463).



How We Approached the Task

The task assigned to the panel, "to consider every aspect of acquisition and to develop a recommended acquisition structure and processes with clear alignment of responsibility, authority and accountability"-- is difficult and complex.

One hundred and twenty-eight prior studies have been done over many years to address perceived problems with the system and to prevent fraud, waste and abuse. In fact, we observed historical evidence that cost and schedule instability has been a problem in past system acquisitions, since the Revolutionary War. We see some of the same issues that the Packard Commission saw 20 years ago as problems today. We asked the obvious question -- why?

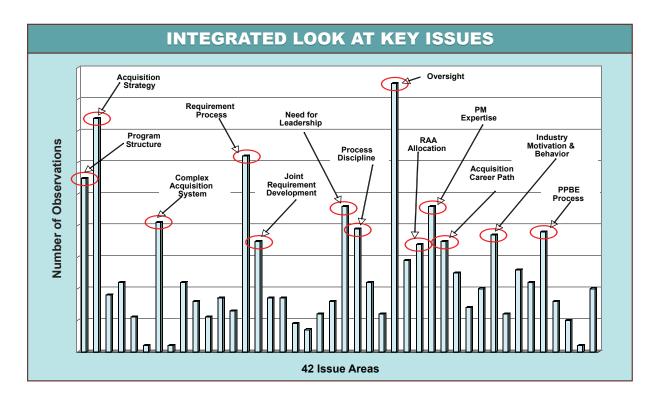
We concluded that the problems were deeply embedded in many of the management systems we use in DoD, not just the traditional acquisition process. We need a radical approach to improvements that would make the process better and adapt these improvements to the new security environment of the 21st century. This assessment outlines our approach.

Detailed assessments are complicated by the absence of a standard, consistent and coherent cost tracking system to add clarity to analysis. Proposing change to improve performance is not without risk. The existing Acquisition System is the product of over 50 years of continuous focus on fielding systems with the best possible performance. Despite its flaws, this system has produced the finest military equipment that the world has known. It has delivered the foundation for today's military and, in the process it has become an important element of US strategic advantage. Therefore, when proposing improvements or modifications to the existing Acquisition System, the potential for unintended consequences must be considered carefully. But failing to improve will have other unintended consequences, and they are potentially more problematic.

We conducted a comprehensive review to form the basis of our assessment that integrated all the parts of the process. We reviewed over 1,500 documents to establish a baseline of previous acquisition reform recommendations, held open meetings and operated a public web site to obtain public input, heard from 107 experts, received over 170 hours of briefings, conducted a detailed survey and interviews of over 130 government and industry acquisition professionals, and subsequently developed 1,069 observations.

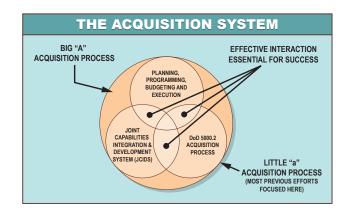
From these observations, we identified 42 areas of interest to focus our work. In addition to creating an integrated assessment of defense acquisition performance, we developed eight specific performance integrated assessments, grouped into six broad areas: Organization, Workforce, Budget, Requirements, Acquisition and Industry. From these specific assessments, we identified necessary performance improvements and defined implementation criteria for each area of improvement.





Understanding the Complexity of the Acquisition System

The Acquisition System is believed to be a simple construct reflecting efficient integration of three interdependent processes, termed "Big A". The processes are budget, requirements, and acquisition. Our observations showed the processes to be a highly complex mechanism that was fragmented in its operation. Further, the observations indicated that differences in the theory and practice of acquisition, divergent values among the acquisition



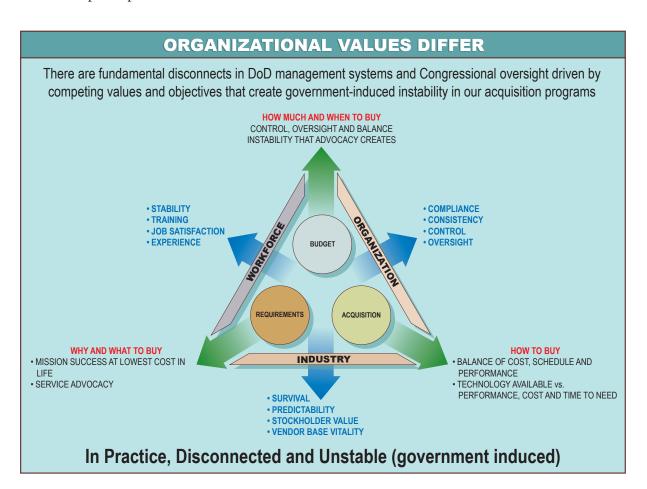
community and changes in the security environment have driven the budget requirements, and acquisition processes further apart and inserted significant instability in the process.

In theory, new weapon systems are delivered as the result of the integrated actions of the three interdependent processes whose operations are held together by the efforts of the organization, workforce, and the industrial partnerships that manage them. However, in reality and practice,



these processes and practitioners often operate independent of each other. Actions in each of the processes cause unintended negative consequences that magnify the effects of perturbations in any one area.

Incompatible actions are often caused by differences in organizational values among process owners and participants.



- Organizations providing oversight and coordination of "little a" acquisition activities value compliance, consistency of approach and control of program activities.
- The workforce is incentivized by job satisfaction, the opportunity for continuous training and stability in the process.
- The budget process values how much and when to buy and focuses on control and oversight to balance the instability that advocacy creates.



- The requirements process values the "why" and "what to buy" issues, focusing on obtaining the ability to achieve mission success at lowest cost in lives.
- The "little a" acquisition process values "how to buy". It strives to balance cost, schedule and performance.

For industry the critical issue is survival followed by predictability in the defense market segment and achieving stockholder confidence.

While each of these sets of values is legitimate, pursuing them without consideration for their impact in other processes adds instability to the overall acquisition process.

These factors are exacerbated by changes in the international security environment. Although the operational environment faced by the US armed forces has changed significantly since the Cold War, the system that we use to design, develop and deliver the systems they need has not changed. Further, efforts to improve the performance of this system have focused almost entirely on only one of part of the process, namely "little a" acquisition.

Major Findings

Several major findings became obvious as we assessed defense acquisition performance and documented the integrated nature of the process. Technology exploitation is a key US strategic

MAJOR FINDINGS

- Strategic technology exploitation key US advantage
- The world has changed
 - Goldwater-Nichols era (post 1986)
 - 20+ primes.
 - multiple new starts
 - huge annual production runs (585 aircraft, 2,031 vehicles, 24 ships, 32,714 missiles)
 - Todav
 - · Six primes DoD can't live without
 - Few new starts
 - Low rates of production (188 aircraft, 190 combat vehicles, 8 ships/subs, 5,702 missiles)
 - Plus a need to be agile

- The acquisition system must deal with external instability, a changing security environment and challenging national issues
- DoD management model based on lack of trust
 oversight is preferred to accountability
- Oversight is complex, it is program focused not process focused
- Complex acquisition processes do not promote success – they increase cost and schedule
- DoD elects short term savings and flexibility at the expense of long term cost increases

For incremental improvement (applied solely to the acquisition process) to achieve success, DoD processes must be stable – they are not



advantage. The fundamental nature of defense acquisition and the defense industry has changed substantially and irreversibly over the past twenty years. The dynamics of the system have changed the acquisition reforms envisaged in the Goldwater-Nichols Act. In 1985, defense programs were conducted in a robust market environment where over 20 fully competent prime contractors competed for multiple new programs each year. The industrial base was supported by huge annual production runs of aircraft (585), combat vehicles (2,031), ships (24) and missiles (32,714). Most important, there were well-known, well-defined threats and stable strategic planning by the Department. Today, the Department relies on six prime contractors that compete for fewer and fewer programs each year. In 2005 reductions in plant capacity have failed to keep pace with reduction in demand for defense systems, (188 aircraft, 190 combat vehicles, 8 ships, and 5,072 missiles). The world has changed!

The Acquisition System must deal with external instability, a changing security environment and challenging national security issues

- No longer is there a single well-defined threat. Instead, the Department must be agile to an unprecedented degree to respond quickly to urgent operational needs from across the spectrum of potential conflicts.
- Although the Department mandates the use of a single, serial acquisition process that
 requires extended planning horizons, the Department's financial model is based on shortterm decision making in which long term cost increases are accepted to achieve short
 term budget "savings" or "budget year flexibility".
- The Department compounds the chaotic nature of its budgeting process with a program oversight philosophy based on lack of trust. Oversight is preferred to accountability.
- Oversight is complex, and it is program -- not process focused. Effective oversight has been diluted in a system where the quantity of reviews has replaced quality, and the tortuous review processes have obliterated clean lines of responsibility, authority, and accountability. The oversight process allows staffs to assume de facto program authority, stop progress and increase program scope. Because the process is focused on programs, not on improving and standardizing the process of acquisition, it inhibits rather than promotes steady improvement in achieving program success.

Complex acquisition processes do not promote program success. They increase costs, add to schedule and obfuscate accountability.

 Over the past twenty years many acquisition reform recommendations have focused on making incremental improvements to a narrowly defined acquisition process. If these incremental improvements to the acquisition process are to achieve success in improving program cost and schedule performance, then all of the processes external to acquisition must operate in a stable and predictable manner. These external processes include, oversight,



budget and requirements as well as organizations that contribute to these processes, to include the Department's leadership, industry, the workforce, and the Congress. They are not stable and predictable today.

• The Department of Defense needs a new Acquisition System that is able to deal with an unstable external environment, diverse and rapidly changing security environments, and challenging national issues that are emerging with the expansion of the global marketplace.

OUR INTEGRATED ASSESSMENT The Government Induced Cycle of Instability Because our major processes are not well integrated: we have an unrecognized, government-induced and long-standing cycle of instability which causes unpredictable cost, schedule and performance that ultimately result in development programs that span 15-20 years with substantial unit cost increases leading to loss of confidence in the DoD Acquisition Systems **Budget, Schedule Budget and** Requirements **Program Instability Adjustments Made** Unpredictable Program Cost, **More Oversight** Schedule, **Applied** Performance Leadership Loses More Confidence in Intervention Acquisition System

Integrated Assessment

We concluded that an effective Acquisition System requires stability and continuity that can only be developed through integration of the major elements upon which it depends:

- *Organization* that structures the processes,
- Workforce that provides the human capital to make the whole system operate,
- Budget that allocates and prioritizes resources among competing needs,
- Requirements that define the needs that the Acquisition System must satisfy,
- Acquisition the processes that manages the creation of new military capabilities, and,
- Industry that actually develops and produces new capabilities for the force.

Ideally, all of these entities must work in harmony to provide a stable and predictable environment that will ensure an effective, efficient Acquisition System. In practice, there are fundamental disconnects in the Department of Defense management systems and Congressional oversight. Competing values and objectives create unrecognized government-induced instability in our acquisition process.





In an unstable Acquisition System, process owners and practitioners take actions without considering the impact these actions will have on the rest of the system. Requirements developers often mandate systems that are technologically unrealistic or unable to be delivered within the "time-to-need" that is desired by Combatant Commander. Program teams often allow requirements to escalate without discipline, driving costs beyond baseline budget and schedule. Those who hold the budget purse strings in the Department of Defense look dispassionately on the system and often reduce annual program budgets to fit within the "top-line" of the President's Budget by trading-off some programs to "fix" others.

This cycle of government induced instability creates a situation in which senior leaders in the Department of Defense and Congress are unable to anticipate or predict the outcome of programs measured by cost, schedule and performance. When Defense and Congressional leaders are surprised by unanticipated cost overruns and failure to meet expected schedule and system performance, they lose confidence in a system that is expected to provide those capabilities. Leaders and staffs at all levels react by becoming more involved, applying more oversight and often making budget, schedule or requirements adjustments that significantly lengthen development and production cycles and add cost.

Performance Improvements

We recommend reducing government-induced instability through an integrated transformation of the major elements of the larger Acquisition System that can reduce cost, enhance acquisition

PERFORMANCE IMPROVEMENTS

Organization

 Realign authority, accountability and responsibility at the appropriate level and streamline the acquisition oversight process.

Workforce

 Rebuild and value the acquisition workforce and incentivize leadership.

Budge

 Transform the budgeting process and establish a distinct Acquisition Stabilization Account to add oversight throughout the process.

Requirement - Process

 Replace JCIDS with COCOM-led requirements procedures in Services, and DoD agencies must compete to provide solutions.

Requirements – Management and Operational Test

 Add an "operationally acceptable" test evaluation category. Give program managers explicit authority to defer requirements

Acquisition - Strategy

- · Shift to time-certain development procedures.
- Adopt a risk-based source selection process

Acquisition - Time Ceratin Development

 Developmental programs must change from a focus on 100 percent performance in the first production lot to a focus on delivering useful military capability within 6 yeas of Milestone A.

Industry

 Overcome the consequences of reduced demand by sharing long range plans and restructuring competitions for new programs with the goal of motivating industry investments in future technology and performance on current programs.

For incremental improvement (applied solely to the acquisition process) to achieve success, DoD processes must be stable – they are not



performance and accelerate by years the delivery of key capabilities.

These key performance improvements involve the same six broad areas: Organization, the Workforce, Budget, Requirements, Acquisition and Industry.

Organization

We recommend that the Department fully implement the intent of the Packard Commission by creating a streamlined acquisition organization with accountability assigned and enforced at each level.

- The Secretary of Defense should direct the Service Chiefs of Staff/Chief of Naval Operations to establish Four-Star Service Systems Commands that report to the Service Chiefs of Staff /Chief of Naval Operations and the Service Acquisition Executives. These Four-Star Service Systems Commands will be responsible for aligning the acquisition workforce to include requirements and acquisition budget personnel, by establishing appropriate certification requirements based on formal training education and practical experience. This organization provides advocacy for the acquisition workforce and will institute formal and informal mentoring of program managers. It will enhance program execution by overseeing day-to-day integration of the acquisition workforce from program initiation at Milestone 0 up to the end of series production. They will direct and manage the preparation of Service Materiel Solution proposals and advocate for the future technology requirements of the Services.
- The Secretary of Defense should elevate both the Service Acquisition Executives Service Under Secretaries to Executive Level 3. Service Acquisition Executives will be accountable for overseeing day-to-day execution and integration of programs through the Service Systems Commands, from the Milestone B decision through final production. This action will ensure that clear lines of responsibility, accountability, and authority for program execution are established and maintained during the system design, development and production phases of major acquisition programs.
- The Secretary of Defense should designate the Under Secretary of Defense for Acquisition, Technology and Logistics as a full member of the Joint Requirements Oversight Council and delegate authority to the Under Secretary of Defense for Acquisition, Technology and Logistics to budget and program for a newly created "Acquisition Stabilization Account." These actions will re-enforce the Under Secretary of Defense for Acquisition, Technology and Logistic's authority and add stability to major defense acquisition programs.
- The Secretary of Defense should assign responsibility for establishing and operating a Materiel Solution Development Process to the Under Secretary of Defense for Acquisition, Technology and Logistics to be responsive to the capability needs of the



Combatant Commands as identified in a new time-phased and fiscally informed Joint Capabilities Acquisition and Divestment Plan. After a Service is selected to deliver a material Solution (Milestone 0) decision authority for (Milestone B) and beyond is nested in the Service Acquisition Executive.

• The Under Secretary of Defense for Acquisition, Technology and Logistics should disestablish the Acquisition Integrated Product Teams and replace the current oversight process with a small staff focused on decision-making to support joint programs. This will ensure that the accountability of Service Acquisition Executives, Program Executive Officers and Program Managers is not diffused.

Workforce

We recommend that the Department realign responsibility authority, and accountability at the lowest practical levels by reintegrating the Services into the acquisition management structure.

- The Secretary of Defense should seek legislation establishing the Service Acquisition Executives as Five-Year Fixed Presidential Appointments renewable for a second five-year term. This will add leadership continuity and stability to the acquisition process.
- The Secretary of Defense should request that the White House Liaison Office create a pool of White House pre-cleared, non-career senior executives and political appointees to fill executive positions to provide leadership stability in the acquisition process.
- The Secretary of Defense should seek legislation to retain high performance military personnel in the acquisition workforce to include allowing military personnel to remain in uniform past the limitations imposed by the Defense Officer Personnel Management Act and augment their pay to offset the "declining marginal return" associated with retired pay entitlement.
- The Secretary of Defense should direct that the number of federal employees, focused
 on critical skill areas, such as program management, system engineering and contracting,
 should be increased immediately. The cost of this increase should be offset by reductions
 in funding for contractor support.
- The Under Secretary of Defense for Acquisition Technology and Logistics, working
 with the Service Secretaries should establish a consistent definition of the acquisition
 workforce to include all acquisition-related budget and requirements personnel.
- The Under Secretary of Defense for Acquisition Technology and Logistics should establish and direct standard and consistent training, education, certification and qualification standards for the entire acquisition workforce including requirements and budget acquisition personnel.





Budget

We recommend that the Department transform the Planning, Programming, Budgeting and Execution process and stabilize funding for major weapon system development programs.

- The Secretary of Defense should establish a separate "Acquisition Stabilization Account" to mitigate the tendency to stretch programs due to shortfalls in the Department of Defense non-acquisition accounts that ultimately increases the total cost of programs. This will substantially reduce the incidence of "breaking" programs to solve budget year shortfalls and significantly enhance program funding stability.
- The Secretary of Defense should create a Management Reserve in this account by holding termination liability at the Service level. Availability of a Management Reserve will substantially reduce the impact of unexpected technical upsets during program execution and thus stabilize the contract management and execution process.
- The Secretary of Defense should direct the Under Secretary of Defense for Acquisition, Technology and Logistics to adjust program estimates to reflect "high confidence" -- defined as a program with an 80 percent chance of completing development at or below estimated cost -- when programs are base lined in this account.

Requirements

We recommend that transforming the requirements process to adapt to the new security environment by including the Combatant Commanders as the driving force for requirements and by changing the operational test process.

- The Secretary of Defense should task each of the Combatant Command Commanders to prepare extended planning annexes to each of their operational and contingency plans, to be updated on a two-year cycle that will provide a fifteen-year forecast of both capability gaps and excesses, relative to mission requirements.
- The Chairman of the Joint Chiefs of Staff should replace the Joint Capabilities Integration and Development System by designating the Joint Chiefs of Staff/J-8 to lead the integration of the Combatant Commands' extended planning annexes into a Department wide, time-phased, fiscally-informed and prioritized Joint Capabilities Acquisition and Divestment plan, to be reviewed and updated on a two-year cycle. This plan will define the capabilities for the new Materiel Solutions Development Process satisfy the Services and DoD Agencies will compete to provide solutions to capability gaps identified in the Joint Capabilities Acquisition and Divestment plan. This will provide a Time Certain Development process to identify, prioritize and act on the warfighters' evolving needs. It will also allow better rationalization and balancing of



requirements. This will add stability to the program initiation process. We have outlined a description of this system and an implementation plan to support "new starts" in Fiscal Year 2008 programs.

- The Secretary of Defense should submit legislation and direct development of implementation Instructions to establish fiscal and time-constraints for Initial Operational Test and Evaluation. Systems would be evaluated as "Operationally Acceptable" when the system performance is not fully adequate when tested against criteria established by the Director, Operational Test and Evaluation, but when the Combatant Commander has determined that the system as tested provides an "Operationally Useful" capability and the Combatant Commander desires immediate fielding of the capability as tested. This will ensure that operational testing focuses on testing in the most likely environments. It will reduce funding instability at the critical transition when programs go to the production phase.
- The Secretary of Defense should seek legislation and direct development of implementation Instructions to create an "Operationally Acceptable" evaluation testing category. This will limit the additional requirements during testing for system performance beyond the levels established at program initiation and therefore add stability to development and provide for the transition to production.
- The Under Secretary of Defense for Acquisition, Technology and Logistics should delegate to Service Acquisition Executives, (and through them and the Program Executive Officers to Program Managers,) explicit authority to reschedule achievement of non Key-Performance-Parameter requirements to future production blocks or program spirals. This will assist maintaining Time Certain Development delivery requirements and will limit the time that systems are in development, thereby reducing program cost risk and enhancing the ability to meet Combatant Commander capability needs in a timely manner.
- The Under Secretary of Defense for Acquisition, Technology and Logistics should direct the Deputy Director for Research and Engineering to coordinate Service Science and Technology transition plans and actively participate in the Joint Capabilities Acquisition and Divestment process to reemphasize "technology push" initiatives. This will mitigate the risk that pursuing a knowledge base approach to system development, and adopting a time certain development acquisition process, could constrain the introduction of "game changing" technologies.

Acquisition

We recommend that the Department change its preferred acquisition strategy for developmental programs that focus on delivering 100 percent performance. The new standard should focus on delivering useful military capability within a constrained period of time -- normally within six



years from Milestone A. Thus, time becomes a Key Performance Parameter.

- The Under Secretary of Defense for Acquisition, Technology and Logistics should direct changes to the DoD 5000 series to establish Time Certain Development as the preferred acquisition strategy for major weapon system development. These strategies will require delivery of the first unit to operational forces within approximately six years of the Milestone A decision. Through early fielding of a basic capability, operational users will gain a clearer understanding of requirements that should be incorporated during future block or spiral upgrades, and technologies will mature that will enable producers to satisfy those requirements.
 - Time Certain Development differs from "evolutionary acquisition" in that a specific time frame is established in which useful military capability will be fielded. Technology readiness levels for the entire capability will support the fielding of the capability in the specific time frame.
 - The time frame will not be adjusted to accommodate new requirements or capability enhancements prior to fielding the useful military capability. "Evolutionary acquisition" and "spiral development" allow for inclusion of enhancements and increased requirements prior to the originally established Initial Operational Capability.
 - Time Certain Development and program management will substantially reduce time in development for systems, reducing pressure on investment accounts and increasing funding stability for all development programs.
- The Under Secretary of Defense for Acquisition, Technology and Logistics should submit proposed changes to the Defense Supplement to the Federal Acquisition Regulations to formalize a risk-based source selection process in which cost proposals are replaced by industry and government agreements on most probable cost. An affordability determination is then made to determine when proposals are within the competitive range. Subsequent to the affordability determination, evaluation factors should be heavily weighted in the areas of technical risk and prime contract and subcontractor management. This will reduce contract performance and cost risk, incentivize industry investment in research and development and capital equipment and add stability to program execution.
- The Under Secretary of Defense for Acquisition, Technology and Logistics should direct conformance with the provision in the Defense Acquisition Guidebook to require that the Test and Evaluation Plan be approved as part of the Milestone B decision and realign the Milestone B decision to occur at Preliminary Design Review. At this stage sufficient information is available and technology maturity and system design are sufficiently mature to set high confidence cost, schedule, and performance thresholds that will meet a



Time Certain Development acquisition timeline. This will substantially reduce program cost, schedule and technical performance risk and substantially increase program stability.

- The Under Secretary of Defense for Acquisition, Technology and Logistics should direct changes to the DoD 5000 series to require the Test and Evaluation Master Plan and the Initial Operational Test and Evaluation Plan to be completed and signed prior to Milestone B. This will reduce the opportunity for operational testing to generate requirements late in the development phase, thereby increasing program stability.
- The Under Secretary of Defense for Acquisition should direct the Service Acquisition Executives to appoint program managers to be held accountable for each baseline with tenure from Milestone B through delivery of the Beyond Low Rate Initial Production Report. This will increase stability of acquisition leadership.
- The Under Secretary of Defense for Acquisition, Technology and Logistics should direct changes to the DoD 5000 series to move Milestone B to after Preliminary Design Review is completed. This will stabilize program cost, schedule, and performance expectations.

Industry

We recommend that the Department share long range plans with industry and restructure competitions for new programs with the goal of motivating industry investments in future technology and performance on current programs.

- The Deputy Secretary of Defense should establish and host regular roundtable events for discussions with executives from Industry. Chief Executive officers of the six defense industry prime contractors and first tier sub-contractors should be invited to participate in these roundtables to share Joint Capabilities Acquisition and Divestment plans and align industry and defense strategic planning. This will encourage industrial investment in areas of importance to the Department and ensure that a robust industrial base responds to the Department's needs.
- The Under Secretary of Defense for Acquisition, Technology and Logistics should direct changes to the DoD 5000 series to require government insight and favor formal competition over "make/buy" decisions for major subsystems where a Lead System Integrators acquisition strategy is involved. Lead System Integrator acquisition strategies reduce subcontractor opportunities to compete and impact the viability of the vendor base, thereby increasing the risk that the Department cannot achieve its required capabilities. For all acquisition category one programs, how Lead System Integrator, prime contractors or original equipment manufacturers select or compete the selections of subcontractors should be a critical element of the source selection competition.





Additionally, management of subcontractors should be a significant evaluation factor in Contractor Performance Assessment Reports.

Aside from this specific recommendation, we propose that the DoD and the Congress take on an evaluation of the impact of industrial consolidation and its unintended effects. Such a review should be conducted with a view toward our current security environment and the nature of our fundamental assumptions about the industry upon which our policy, laws and regulations are based.

Our Perspective and Commitment

To achieve success for incremental improvements that are applied solely to the acquisition process, DoD acquisition processes must be stable – they are not. We concluded that the problems we face are deeply imbedded in many DoD management systems. We therefore need a radical approach to improvements to stabilize the processes and adapt them to the new security environment.

One thing is clear -- the larger acquisition process was designed and optimized to respond to a security environment dominated by a single strategic threat, the former Soviet Union. The security environment is very different today -- therefore, acquisition processes need to meet the demands of this new environment. We must have the flexibility and agility to respond to more dynamic security challenge and rapidly changing needs.

The hours we spent were rich in providing an opportunity to view the entire spectrum of issues --past and present, and to look through a prism to the future. Implementation is about the future. Implementation is about putting everything in focus.

The performance improvements we propose will significantly enhance the Department's ability to deliver capabilities to the warfighter by stabilizing and integrating key elements of acquisition. Taken together our recommended performance improvements represent a significant transformation of the Acquisition System and are designed to address the sources of instability and lack of accountability. We believe we have offered an integrated set of performance improvement, to reduce government instability and complexity. Implementation will require leaders to make hard choices, but the potential payoff is the Acquisition System that reformers sought for decades - on Acquisition System that delivers to its commitments.

It is one thing to create and establish vision and to recommend focusing on change – it is quite another to understand the unity of purpose required to achieve success and to ensure that the stakeholders understand not only what is written and said but what we "meant to write and say" about these ideas and issues. We tried to be as clear and unambiguous as time and talent allowed, but this subject is extremely complex. We understand that there will be a need to clarify, interpret, dialogue and explain our effort.

Because these are hard choices with potential unintended consequences, implementation should be approached rigorously. Coincident with meeting the implementation criteria, we recommend that



the Department do "strategic gaming" on the changes to get better insight and confidence is the intended outcome. We recommend that the Department do "strategic gaming" on the changes to get better insight and confidence is the intended outcome. Our legacy of "war gaming" has served us well in operations. We should use this war gaming approach to manage change in out Acquisition System.

The timing for change has never been better. The abiding interest of Congress in ensuring that the funding it provides is turned into usable and effective military capability, the Secretary of Defense's dedication to transforming the way the Department of Defense does its acquisition business, and the Quadrennial Defense Review challenge to improve the acquisition process all combine to create a very fertile ground for change. The Defense Acquisition Performance Assessment Panel is committed to the validity of its assessment and the value of its recommendations for improvement.



